

Serial No.: 10/558,893

Atty. Doc. No.: 2003P06127WOUS

Amendments to the Claims:

1 – 9 (canceled)

10. (currently amended) A combustion chamber for a gas turbine, comprising:

a combustion chamber wall;

a liner formed from a plurality of heat shields on an inside of the combustion chamber wall;

an inner space formed between the heat shield elements and the combustion chamber wall and exposed to a cooling medium, wherein said liner is made from a leak-free material such that the inner space is configured to direct the cooling medium along a cold side of the liner and within the inner space, and to a burner for combustion in the burner upon exiting the inner space;
and

a flow element arranged in the inner space for selective adjustment of a cooling medium stream, the flow element arranged on the combustion chamber wall,

wherein a longer side of the flow element is adjacent and in contact with the combustion chamber wall such that the longer side is defined by a plane that is substantially parallel to and encompasses the combustion chamber wall.

11. (previously presented) The combustion chamber as claimed in claim 10, wherein a flow channel for cooling medium is formed by the flow element causing a flow velocity of the cooling medium stream to be increased compared with the flow velocity upstream of the flow element.

12. (previously presented) The combustion chamber as claimed in claim 10, wherein a heat shield element is assigned a respective flow element for the purpose of cooling a thermally heavily loaded wall section of the heat shield element.

13. (previously presented) The combustion chamber as claimed in claim 12, wherein the heat shield element is a single-shell hollow vessel with a cavity in which the flow element is disposed so that the flow element is encompassed by the single-shell hollow vessel and the heat shield element is mounted on the combustion chamber wall.

14. (previously presented) The combustion chamber as claimed in claim 12, wherein the heat shield element has a surface region with a surface contour curved along a longitudinal axis and a transverse axis.

15. (previously presented) The combustion chamber as claimed in claim 10, wherein the flow element is mounted on the combustion chamber wall using a mechanical latching element or a screw connection.

16. (previously presented) The combustion chamber as claimed in claims 10, wherein the flow element is detachably connected to the combustion chamber wall.

17. (previously presented) The combustion chamber as claimed in claim 10, further comprising a flow element made of metal.

18. (previously presented) The combustion chamber as claimed in claim 17, wherein the metal flow element is made of a metal sheet or a metal casting.

19. (currently amended) A gas turbine having a combustion chamber, comprising:
a combustion chamber wall;
a liner formed from a plurality of heat shields on an inside of the combustion chamber wall;

an inner space formed between the heat shield elements and the combustion chamber wall and exposed to a cooling medium, wherein said liner is made from a leak-free material such that the inner space is configured to direct the cooling medium along a cold side of the liner and

within the inner space, and to a burner for combustion in the burner upon exiting the inner space;
and

a flow element arranged in the inner space for selective adjustment of a cooling medium stream, the flow element arranged on the combustion chamber wall,

wherein a longer side of the flow element is adjacent and in contact with the combustion chamber wall such that the longer side is defined by a plane that is substantially parallel to and encompasses the combustion chamber wall.

20. (currently amended) A flow element arranged in a flow channel between a combustion chamber wall and a heat shield element in a combustion chamber of a gas turbine, comprising:

a surface of the flow element located near a cold side of the heat shield such that the flow channel becomes more narrow, said flow channel configured to direct a cooling medium along the cold side of the heat shield and within the flow channel and to a burner for combustion in the burner upon exiting the flow channel;

a surface contour of the surface adapted to approximately match a surface contour of the cold side of the heat shield element,

wherein a longer side of the flow element and the surface is adjacent and in contact with the combustion chamber wall such that the longer side is defined by a plane that is substantially parallel to and encompasses the combustion chamber wall.

21. (currently amended) The flow element as claimed in claim 20, wherein ~~a~~the cooling medium flowing in the flow channel is caused to accelerate as the cooling medium flows by the surface.

22. (previously presented) The flow element as claimed in claim 20, wherein the flow element is approximately rectangular in shape and the surface forms the longer side of the rectangle.

23. (previously presented) The flow element as claimed in claim 20, wherein a heat shield element is assigned a respective flow element for the purpose of cooling a thermally heavily loaded wall section of the heat shield element.

24. (previously presented) The flow element as claimed in claim 20, wherein the heat shield element is a single-shell hollow vessel with a cavity in which the flow element is disposed so that the flow element is encompassed by the single-shell hollow vessel and the heat shield element is mounted on the combustion chamber wall. .

25. (previously presented) The flow element as claimed in claim 20, wherein the flow element is approximately triangular in shape and the surface forms the longer side of the triangle.

26. (previously presented) The flow element as claimed in claim 20, wherein the surface is approximately parallel to the cold surface of the heat shield element.